

****Community Medicine Summery****

Dr. Samar

Lec #1

- Stress is the most dangerous risk of immunity reduction
- Health indicators (the most important) is % of death
- Maternal Health Care is --> During pregnancy, Labour and after birth
- Child Health Care --> 0 to 18 years
- Risk Factors in pregnancy : 1. Poisoning during pregnancy 2. # of pregnancies until now
- Main causes of chronic diseases aren't known but there are many leading causes and risk factors
- Genetic factor is the main risk of breast cancer
- Obesity is the main risk of Diabetes
- Hyper Cholestremia is the main risk of heart attacks

- Lec #2

- Before 19 years old , the person is still developing mentally and physically, so we can't say he has a " personality disease " before becoming 19 , after becoming 19 , when his personality is fully formed , we can then diagnose such disease (ex. Border line personality disorder)
- diseases that affect mental health : 1. OCD 2. Scetzopherenia
- A leading cause for social isolation is low grading in school
- Smokers in general have something unusual in their personalities related to the emotional part
- There's no one 100% Healthy
- 90% of PHC patients are suppose to be coming for preventive services (Checking health status) while only 10% should be for curative services (illness and sickness)

- referral step (getting back from secondary to primary health care) isn't applied in the developing world as the developed world

- PHC should be more affordable than surgery or specialists , that's why low portion of medical students go to family medicine.

The main cause for direct attending to specialists is the economic nature, there's no law that obligates the patient to go first to the family doctor, so for saving money he goes directly to the specialist That's why we don't have proper and enough well trained family physicians.

Lec# 3+4

10 % of elderly develop 2nd depression.

Health indicators : reflect the health status .

1- life expectancy.

2-Infant mortality rate : in first year .

Neonatal mortality rate : first month .

Perinatal mortality rate : one week before and after the delivery .

*Increase the risk of death in the first hours after birth .

Slide53# Life expectancy in Jordan :

In 1965 = 49 years

In 2012=73 years

Life expectancy ranging 57 years in developing countries 76 years in developed countries (important)

Slide54# Infant mortality :

1960 =130/1000 live birth .

2012=17/1000 live birth .

Slide55# Fertility rate in Jordan : 2012=3.5

* notice that no big difference between 2002, 2007 and 2012 .. because of unmet need .

* Small-pox eradicated in 1979

Slide56# All numbers are important

Slide59# Population density concentrated mainly in center . Center > North > South .

Slide62# Urban population : 2012=82.6 %

* The services distributed highly in urban because population concentrated there (in Jordan) .

Lec#5

(from slide 74 – 85)

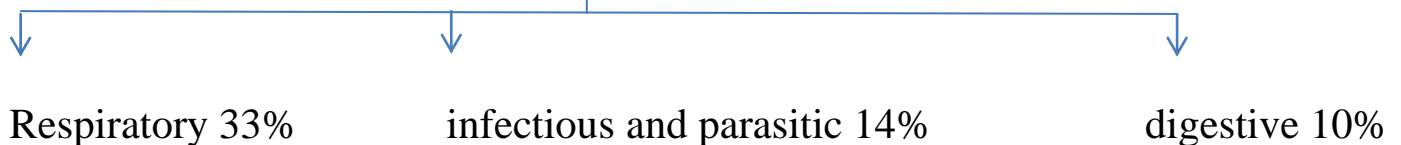
- PHC services started in the world in 1979.
- PHC services started in Jordan in 1986 .
- life expectancy in the developing world 73 .
- life expectancy in the developed world 82-84.
- urban population in Jordan (2012) is 82% (highly urbanized) .
- Jordan's population is 9 million (small community).

*Services are classified into curative services and preventive and primitive services :

In the developed world → curative 10-20% -

→ Preventive and primitive 80-90%

-In Jordan → curative more than 50%



*Causes of death (globally) :

الدكتورة قالت نحفظ الترتيب و النتائج و اهم الاسباب و نسبة الوفيات

- low income countries (44.7% of death globally)

Mostly infectious

- | | |
|--------------------------------|--|
| 1) lower respiratory infection | 2) coronary heart disease |
| 3) diarrhoeal disease | 4) HIV |
| 5) stroke cerebrovascular | 6) chronic obstructive pulmonary disease |
| 7) tuberculosis | 8) neonatal infections |
| 9) malaria | 10) prematurity |

-middle income countries (41.5% of death globally)

Mostly noninfectious

- | | |
|----------------------------------|--------------------------------|
| 1) stroke cerebrovascular | 2) coronary heart disease |
| 3) chronic obstructive pulmonary | 4) lower respiratory infection |
| 5) lung cancer | 6) road traffic accident |
| 7) hypertensive heart disease | 8) stomach cancer |
| 9) tuberculosis | 10) diabetes |

-high income countries (13.8% of death globally)

Mostly noninfectious

- 1) coronary heart disease
- 2) stroke cerebrovascular disease
- 3) lung cancer
- 4) lower respiratory infection
- 5) chronic obstructive pulmonary
- 6) dementia
- 7) colon cancer
- 8) diabetes
- 9) breast cancer

} The same

10) stomach cancer

* Causes of having low death rate in developed countries compared to developing countries :

- 1) low quantity and prevalence of services in developing countries
 - 2) fertility is high in developing countries
 - 3) life expectancy is high in developed countries
-

* Causes of death in Jordan :

الدكتورة قالت اول 3 سنوات النسب ليست حفظ بس مقارنة اما سنة 2010 كل النسب حفظ مع الترتيب

- 1979

- | | |
|---|-----------------------------|
| 1) cardiovascular diseases 23% | 2) respiratory diseases 20% |
| 3) diarrhea 16% | 4) accidents 9% |
| 5) Complications of pregnancy and childbirth 6% | 6) cancer 5% |
| 7) malnutrition 3% | 8) others 19% |

- 1991

- | | |
|--|------------------------------|
| 1) cardiovascular / hypertension 39.7% | 2) accidents 8.9% |
| 3) pneumonia 4.6% | 4) cancer 3% |
| 5) kidney diseases 2.3% | 6) liver diseases 1.5% |
| 7) communicable diseases 0.3% | 8) unspecified causes 39.6 % |

- 2005

- 1) Disease of circulatory system 41.97%
- 2) Neoplasm's 13%
- 3) Accidents and adverse effects 10.5%
- 4) Conditions originating in the perinatal period 7.39 %

- 5) Disease of respiratory system 6.24%
 - 6) Cause could not be determined 4.02%
 - 7) Congenital malformations, deformities and chromosomal abnormalities 4%
 - 8) Cause of urinary system
 - 9) Diseases of digestive system
 - 10) III-defined and unknown causes
- } The same 3%
- 11) Infectious disease 2.4%
 - 12) Endocrine and metabolic disorders, diabetes 1.5%
 - 13) Diseases of the nervous system 0.6%
 - 14) Diseases of the blood and forming elements 0.2%
 - 15) Pregnancy , childbirth, and the puerperium 0.11%

- 2010

- 1) Ischemic Heart Disease 18%
- 2) cancer 15%
- 3) stroke 12%
- 4) diabetes 7%
- 5) Congenital Abnormalities 4%
- 6) chronic kidney disease 4%
- 7) road injuries 4%
- 8) lower respiratory infection 3%
- 9) Pre-Term Birth Complications 2%
- 10) Chronic Obstructive Pulmonary Disease 2%

Dr. Serein :

Lec#1

(from slide 1- 17)

- industrialized countries have aging population because of having good life , jobs , schools and healthcare
- the first killer for youth is motor vehicle accidents
- total fertility rate (TFR) in Jordan in 2012 is 3.5
- TFR (average number) in the world is 2.9
- fecundity ranges between 0-30 children
- the percentage of using contraceptives in Jordan is 42%(lower than western countries)
- the lowest fertility rate is in Spain 1,15 because 72% use contraceptives
- Russia achieved low fertility rate due to having easier access to abortion
- breast feeding in Africa for 2-3 years

** NOTE : general factors (slide 13) are sometimes called indirect or distant factors

Lec#2

- In Jordan , less than 40%(37.3%) of population are <15 years-old while in developed countries less than 25% are <15
- In Jordan, less than 4% are <65 while in developed countries they are more than 10%
- In 1995, the median age in Jordan, with a young population, was 18. In 2012, median age in Jordan was 20,3 years (2012).
- The sex ratio at birth in most countries is about 105 or 106 males per 100 females (and in Jordan it is around this age)
- Jordan has a rapidly growing population, like other developing countries
- population changes in three ways: birth , death and migration.
- In Jordan, Growth rate is 2.2 % and natural growth rate is 2.1% .

Lec #3

Slide34 -64

- In developing countries : 40% of population → less than 15 years
Less than 4% → >65 years
- Developed countries : 10% of population → > 65 years
Less than 25% → < 15 years
- Median age in Jordan : at 1995 : 18 years
at 2012 : 20.3
- Sex ratio in world : 105-106 males per 100 females (births)
- Population pyramid in developing countries has a wide base → #of young people is high
- Senegal & Jordan : rapid growth
- Italy : zero/ decline growth
- US : slow growth
- Emigration : to the Outside
- Immigration : to the Inside
- At older times (before the 20th century) the population growth was slow :
 - 1) Many diseases , no medication . (child disease prevalence)
 - 2) Wars
 - 3) Economic situations
 - 4) Nutritional problems
 - 5) Old methods of agriculture and food harvesting
- Jordan growth rate : 2.2 (births, deaths & migration)
- Jordan natural growth : 2.1 (only births & deaths)
- Slide#54 → equation to be memorized (الدكتورة حكمت في احتمال تجيب حسابات)
For this equation : if the net migration was to the INSIDE we put (+) , but if the net migration was to the OUTSIDE we put (-)
- NOTE: don't mix the growth rate with the birth rate
- Slide # 57 : memorize the stages not the numbers
- Slide # 59-64 : only memorize the numbers that were mentioned in the previous lectures

Dr. Samar again

Lec #1 again.

- Infant mortality and maternal mortality is closing to zero in developed world while is in huge numbers in developing world .
- Increasing fertility means increasing mortality.

- Two thirds (More than half of the population) are Children under 15 + Females in maternal reproductive age .

- Premarital care in the developed world is mainly educational counselling. - In Jordan it's genetic counselling (Thalassaemia test)

- Another service provided during premarital care is fertility investigation.

* Do they have proper fertility or not ?

* For women : By Ultrasound (US), Hormonal test, Having a regular period.

* For men : Seminal fluid " Semen " analysis.

- Prenatal (Antenatal) care monitors pregnancy.

- Maternal Post Partum care : Maternal Services after birth .

- In WWW related to labour procedure, Who refers to who's attending delivery ? (who's delivering the baby ?)

- Consequences of early labour is more on the baby than the pregnant mother, she can tolerate but the baby can't .

- Miscarriage (abortion - like , happens after the 3rd month and before 36 weeks of pregnancy)

- Induced abortion is illegal in Jordan but used in the developed world and some of the developing world as contraceptive method for family planning services.

- Miscarriages + Abortions are main risks facing pregnant women . - 80% of pregnancy deaths happen by causes directly related to pregnancy, this percentage can be avoided by proper prenatal services .

- Lec#2

- Reproductive age (15- 49) - Adolescence (9 - 19)

- Percentage women in giving birth age + Children > 50% - 80% of maternal deaths are because of direct pregnancy risks

- Babies are more sensitive to death during labour

- In Labours that cause mother's death , their babies in most cases won't live until their first year.

- Anaemia + Obesity are the highest nutritional risk factors regarding the mother
- 8 to 11 Kg should be added to mother's weight during pregnancy.
- (Check please) 7th to 9th month --> before mature

Before 36 moths --> Pre mature

Lec#3

- Note that maternal death is measured for each 100,000
- Leading cause for death of women in the reproductive age (15-49) in Developing countries : death due to Pregnancy related causes
- Leading cause for women`s death in developing countries : Breast cancer
- 500,000 die due to pregnancy related causes
- More than 7 million still birth and newborn (1st week) deaths are believed to result from maternal health problems and their mismanagement.
- Remember : still birth : intra-uterine during labor
- In developing countries :
 - * 150 million become pregnant/ year → 500,000 die due to pregnancy related problems (complications)
 - * 500,000 / year → almost 1500 per day
 - * For every such death there are 20 others who suffer pregnancy related illnesses or other adverse outcome (obstetric fistula, uterine prolapse) → almost 10 million

Lec#4

- For each 20 sick there is 1 death
- Maternal period is : Pregnancy , birth , after birth
- Mother / Child transmitted diseases occur from pregnancy untill 6 months after birth Preeclampsia (a hypertensive disease) that causes hypertension + Edema + proteins in urine , is a pregnancy related disease (pregnancy induced) and it's gone when giving birth .
- Haemorrhage is #1 cause of mortality #4 cause of morbidity
- Up to 27% of antenatal patients have Anaemia of Iron deficiency type .

- Eclampsia starts after 20 weeks but signs appear after 30 weeks of pregnancy.
* most developed in : Primer " first pregnancy " , overweight, genetic history of eclampsia

- MMR (Maternal mortality rate) dropped in Jordan from 41 to 19 in the period of 1995 – 2009

- After 6 weeks of giving birth , the uterus should be back to normal

Lec#5

- Antenatal services reflect maternal health related to maternal mortality services

- Perinatal (Early neonatal) deaths are 1st week deaths

- Infant deaths are deaths before 1st year after birth

- Post natal (after 4 to 6 weeks of giving birth)

- Well baby clinic is child health care for children less than 5 years old .

- Average baby weight at birth (2.5 - 3.5 Kg) Doubling the weight after 6 months Tripling the weight after 1 year

- Average baby height at birth (52 - 53 cm) Doubling the height to 1m after 4 years Tripling the height to 1.5 after 12 years * taking into count the genetic factors

- Graduating baby visits to the clinic : A visit on the first month ---> A visit each 2 months until reaching 6th month --> 9th month visit --> 1st year visit --> A visit each year until reaching 5th year .

- attention deficiency disorder is the most common educational problem facing adolescents.

- Neonatal mortality is babies death on first month , it represents 75% of infant mortality.

- IMR (Infant mortality rate) is per 1000 live births , this means that " still birth " babies aren't counted

- Still birth babies are babies born dead .

- Leading causes of neonatal mortality are birth defects and disorders related to short gestation (pregnancy).

- U5MR (Under 5 mortality rate) reflects an indicator to infant mortality

- Rehydration is necessary in cases of severe diarrhoea .

Lec#6

- Perinatal care is health service in the last trimester of pregnancy (last 3 months) + labour + 1 week after birth * in this time there are higher complications of pregnancy

* More than 38% of cases are in South Asia

- The most important service to reduce maternal mortality and risk is prenatal care (during pregnancy)

- For the baby , WBC (Well baby clinic) provides services like : 1. Nutrition 2. Vaccination

- Infections are the leading cause to U5 children deaths

- Some bacterial infections caused death due to several diarrhea

- Percentages in Piechart of U5 death causes are required

- Postnatal care is health service during the first year after the 1st month .

- Comparing infant mortality (17) to child mortality (21), infant mortality is 25% less than child mortality .

We are deeply sorry if there was any mistake, we`re more sorry that the summery is 12 pages ☹ we`re even more & more sorry that we have a subject named community medicine!! , but you gotta do what you gotta do.

Good Luck my friends ☺

Thank you:

Mariam Hassouneh , Nermeen Dweikat , Rama Toukan , Duha Atieh ,

Mai Ababneh. ☺